

The Online Social Movement of #NeverAgain: How Social Networks Build a Sense of Membership, Influence, Support and Emotional Connection on Twitter

Neil Alperstein^{1*} and Tina Jones²

¹Department of Communication, Loyola University Maryland, Baltimore, MD 21210

²Department of Communication, Emerging Media Graduate Program, Loyola University

*Corresponding Author: nalperstein@loyola.edu, Twitter: @NeilAlperstein

The purpose of this research is to better understand the ways in which social media is utilized to further political and social causes. The research focuses on the aftermath of the 2018 shootings at Stoneman Douglas High School in Parkland Florida and the rise of the #NeverAgain movement, also known as March for Our Lives. In contemporary social movements hybrid activism accounts for both the physical and digital aspects of activism; this study takes a social network analysis approach to better understand how social networks develop around social and political issues, as social networks form not as a monolith but rather operate as clusters and niches based on particular interests or the situational relevance for those engaged. The

research, based on an analysis of one-hundred thousand tweets that utilized the #NeverAgain hashtag, found four categories of tweets that ranged from spreading information to sharing personal stories. A sentiment analysis was conducted that indicated that language was contextual, meaning that an overtly negative term might be utilized in a more positive vein. Data visualizations demonstrate how social networks, while led by elite, non-elite and core mediators, also represent diffused groups that are composed of weak ties.

Keywords: social network analysis, social and political movements, Twitter, #NeverAgain

In recent years there has been an insurgence of online activism, sometimes referred to as clicktivism (Regan, 2015). Clicktivists form an online community through likes on Facebook, participating in Moveon.org polls and through hashtag campaigns on Twitter, among other possibilities. Those individuals who are engaged in a social or political movement online may be referred to as hashtag warriors. A question raised by this research regards how social activism – the deliberate action to bring about social change – has been impacted in the age of digital media in which social media has become a tool to, at the very least, raise awareness of an issue and at most to

motivate people to participate in a more direct manner. While raising visibility of an issue is critical and can be facilitated by social media through hashtag activism, this is just one step in a larger process toward motivating people to become activists beyond their social media engagement. In other words, hashtag activism doesn't necessarily make one a social activist *per se* unless there is other work on the ground being done to facilitate change (Aalia, 2018).

Social media is a free and expedient way to communicate about trending topics, as platforms like Facebook, Instagram, and Twitter have the unparalleled ability in media history to reach many millions of people across the world (Ortiz-Ospina, 2019). And, the use of social media has grown in ways that users create, share and spread information, providing social support and engage audiences in the form of social networks on social and political issues as well as hot-button topics. As virtual or imagined communities form around a social or political issue, social media provides social networking opportunities that may go beyond education to motivate people to become activists. The present study takes a social networks approach to understand how social movements operate within this age of digital media and hybrid activism (Treré, 2019). The research conceptualizes social networks as clusters of "publics"; publics being groups of people—demographics notwithstanding—that come together around an issue. Situational theory of publics suggests that people may be active or passive on issues that are of importance to individuals (Grunig, 2005). Activism in the digital age may be exemplified when people decide to take to the streets in order to protest, or perhaps not, remaining hashtag warriors. But in this age of digital media, the concept of situational relevance needs to be extended to consider not just how activism or passivity operate on a continuum, but how this concept plays out on social media platforms, as social networks operate in a manner accessible by anyone with an internet connection as a place in which competing ideas are at work. This research will focus on the nature of and degree of involvement of participants in social networks that formed in the aftermath of the 2018 shootings at Stoneman Douglas High School in Parkland Florida and the rise of the #NeverAgain movement.

Social injustices have in recent years given rise to a wide array of hashtag movements. A few high-profile examples include the Arab Spring (Hussain & Howard,

2013), Occupy Wall Street (Ranney, 2014), Iran's Green Movement (Ansari, 2012), and Keystone XL pipeline movement (Hodges & Stocking, 2016). In addition, recent movements include #NeverAgain after the Parkland high school shooting, the subject of the present research, the rise of #BlackLivesMatter after the acquittal of George Zimmerman in the Trayvon Martin case and the #MeToo movement in response to the allegations brought against Hollywood producer Harvey Weinstein. The #NeverAgain movement that evolved into March for Our Lives and Road to Change was launched by Marjory Stoneman Douglas High School students after the February shooting that resulted in the death of 17 of their fellow students and staff members (Barnett, 2018).

THE RISE OF THE #NEVERAGAIN MOVEMENT

It was forty days after the shootings at Stoneman Douglas High School in Parkland Florida that a group of students mobilized to conduct a nationwide protest to support gun control in the United States (Burch & Mazze, 2018). Operating under the banner of March for Our Lives, the emerging movement utilized the hashtag #NeverAgain as a calling card. The Parkland shootings unwittingly thrust several of the students into a “kind of terrible celebrity that only afflicts the very talented or the very unlucky” (Robinson, 2018). Key mediators played an important role in initiating and sustaining the social movement. Christiansen described four stages of a social movement including the following: emergence, coalescence, bureaucratization and decline (2009). In the case of the Parkland students, several mediators from the emergence stage of development have worked to sustain the movement. Although they did not seek out this platform, rather it was thrust upon them, the mediators of Stoneman Douglas High School at the initial stage utilized social media to raise awareness of the need for better school safety and extended their cause to inspire thousands of young people to register to vote.

After the shooting, many Parkland students were motivated by personal fear to champion gun reform, however, several key mediators emerged like Emma Gonzalez, one of the most visually present and vocal leaders of this movement. Isa and Himelboim describe social mediators as “influential key actors who attract more attention in their own clusters (defined by in-degree centrality) and act as a bridge between two clusters (defined by betweenness centrality) This unique position in the network allows them to spread information within their own clusters and to other clusters, which would otherwise

be devoid of that information” (2018, p.4). Gonzalez, whose Twitter handle is @Emma4Change, has twice the Twitter followers as the National Rifle Association (NRA) and uses her platform to inspire others to join the movement, console students who have survived shootings across the world, and call out politicians whom she feels treat her and other student survivors of gun violence with little or no respect. Another key mediator is David Hogg. Some critics of his outspokenness even suggested he wasn't a Parkland student at all, rather a crisis actor placed in front of cameras to “push the left’s anti-gun agenda” (Filipovic, 2018). His detractors were perhaps hoping the negative publicity would discredit him as well as other Parkland students championing the fight for gun reform. Another key mediator is Cameron Kasky, a Parkland survivor who has been front and center on both mainstream media as well as social media. He has appeared with Gonzalez and Hogg on *The Ellen Show*, *The Today Show*, and *Jimmy Kimmel Live* (Newkirk, 2018).

The purpose of this research is to investigate how the Parkland students utilize social media in order to build a social and political movement, furthering the cause they champion and, in the process, created a large and complex social network. In particular, this research will investigate the use of the hashtag #NeverAgain on Twitter as an example of how social media may be utilized to further public issues and causes in the digital age.

Theoretical Framework

One of the unique aspects of digital media is the ability to by-pass traditional gatekeepers like government censors (in most countries) and news media to mobilize both local and perhaps international support. However not all members of an emerging movement start out as or ever become activists even though they may engage in the movement online. Publics, which may include individuals active on an issue, are formed based on the situational relevance of an issue and the degree to which individuals feel they can make a difference. According to situational theory, four types of publics may emerge: active, aware, latent and non-publics (Grunig, n.d.). Factors that determine the degree of activism within a public’s response to an issue include: the ability to recognize that a problem exists, one’s feeling that something can be done about the problem, and an individual’s personal involvement in a particular issue.

As a diffuse audience, digitally based social networks may develop as an imagined community, which is not a public in the traditional sense, although Gruzd et al. introduced the idea that communities can exist around an idea or ideology and the members of the community do not actually have to know one another. He refers to this as the tension between “concrete social relationships and imagined sets of people perceived to be similar” (Gruzd et al., 2018, p. 2). It is simplistic to think that what takes place on social media is a conversation with groups of like-minded people and perhaps elites out to achieve a common goal. “The members of even the smallest nation will never know most of their fellow-members, meet them, or even hear of them, yet in the minds of each lies the image of their communion” (Gruzd et al., 2018, p. 6). This somewhat romanticized vision social networks rather than being made up solely of like-minded people, also contain detractors among other actors. There is tension that exists among the clusters that make up a social network. This appears to be what is happening on Twitter. Users could never know everyone on Twitter, but they are likely aware of other users’ presence, especially in their ‘neighborhood’ of sources (Gruzd et al., 2018). As these researchers point out, social platforms such as Twitter allow for one to gain followers simply by making a comment, but an in-person connection does not need to exist in order for the community to be valid.

The idea of imagined communities is pre-dated by Stanley Milgram’s notion of familiar strangers. The concept came from a paper Milgram published in the early 1970s—the pre-internet era—in which he described those individuals in a physical world who do not know each other but share some common attributes like interests, occupation, location, among other common connections (Milgram, 1977). An example would be people taking the same commuter train daily would become familiar with one another but not know one another. In an online world, however, familiar strangers could be defined as those individuals who are not friends with each other — not in each other's social network — but they share some common set of attributes or interests, although there is no requirement that there be agreement in order to engage on a social issue (Agarwal, 2009). In other words, digitally based social networks are more likely to be contentious rather than harmonious, although there may be clusters within the broader network that represent each. Whether or not those clusters are “talking” to one another remains to be seen.

The concept that connections or “ties” made with people one does not know personally is referred to as the strength of weak ties, a theory put forth by Mark Granovetter (1973). He states that strong ties are the people you know well and with whom you have regular interactions; weak ties are acquaintances (seen in Miller, 2011). Granovetter suggests that the weak ties in a social network are sometimes the element that keeps the entire relationship strong; hence his strength of weak ties theory. If one exists in a tight social circle there is a chance one could miss information that a weak tie could provide. Because weak ties are on the edges of one’s social network, they are gathering information that one may not normally have access to in one’s immediate social relationships. Additionally, as there is less dissonance, meaning less riding on the relationship, weak ties gain strength not afforded to strong ties. It may be that with regard to conceptualizing publics engaged in a social movement that in a social network, communication based on weak ties may motivate an aware public to become an active public.

While Granovetter’s theory pre-dates the Internet, we can see it applied in several more recent events fueled by digital media including the Arab Spring, #MeToo as well as the #NeverAgain social movement. The Arab Spring was first seen in late 2010 early 2011, and it was the use of social media to highlight dissatisfaction with the government of Tunisia (NPR, 2011). Social media was used by Tunisians to organize protests, spread ideologies and try to push President Zine El Abidine Ben Ali out of power. It was also the use of mobile phone cameras depicting the horrible conditions being streamed globally that demanded action (NPR, 2011). This revolution spread virally online and eventually extended throughout the Middle East, most notably in Egypt, with Esraa Abdel Fattah, an Egyptian democracy activist known as Facebook Girl leading the fight (NPR, 2011). She organized the protest in Tahrir Square on January 25 to demand the removal of President Hosni Mubarak but is the first to admit democracy is not easy and “isn't so sure the work is over” (NPR, 2011). The community of hacktivists, in this case, was started by young Tunisians who filmed the protests that arose after 26-year-old Mohamed Bouazizi burned himself alive in his own form of protest after being embarrassed by a police officer (NPR, 2011). Posting such potent images on social media fanned the flames of outrage and with

fellow citizens, who may not have even known Bouazizi, banned together to create a movement, an example of the power of weak ties, to combat the government.

In the #MeToo movement, a community grew around and was created by survivors of sexual harassment or assault. Thanks to an exposé written by Ronan Farrow, published in *The New Yorker* magazine, where he exposed the years of sexual misconduct by Harvey Weinstein, a social movement arose greatly fueled by social media (Farrow, 2017). Farrow credits the First Amendment for #MeToo taking flight, however, free speech notwithstanding, once the hashtag #MeToo was disseminated the movement took on a life of its own. The hashtag which has been tweeted 19 million times was “originally started as a grassroots effort by activist Tarana Burke more than 10 years ago but set the internet ablaze after a tweet using the hashtag was posted by actress Alyssa Milano. Those two simple words “Me Too” have become a viral rallying cry for millions of women, and some men, who are fed up with the blatant abuse of power” (Brown, 2018). Though Burke and Milano had no known connection, other than the movement, the impact of the #MeToo movement continues to impact society. In a similar manner the #NeverAgain movement, while it started with an actual event—a tragedy—that was covered by news media but gained momentum as the hashtag began to proliferate across social media platforms. #NeverAgain had a policy goal (stricter background checks for gun buyers), and a plan for a nationwide protest (March for Our Lives), and it had a group of digital natives who were skilled at keeping the issue before the public eye. The well-organized movement led to a summer tour to register voters, educating voters on gun laws and pushed a strong platform to create social change.

Perhaps because of its reliance on hashtags, Twitter has demonstrated its effectiveness in launching and furthering social movements (Conway et al., 2015; Parmelee, 2013). Hashtags are searchable, which may create greater visibility for an issue. In addition, Twitter utilizes @ (mention) options, direct messaging (DM) and retweets as techniques. Research suggests that Twitter holds these unique qualities: “transparency, privacy, security, and interpersonal trust” (Bennett & Segerberg, 2012, p. 753). As Twitter is a public forum, other research points out that it is quite mobile in motivating activists (Hermida et al., 2014). Whether it is core (media) or elite (celebrities) actors engaged in a social movement, there is the opportunity for immediacy that may fuel

the emergence of a social network. This research seeks to answer the following research questions:

RQ1: How does leadership within the social network impact the emergence and further development of the #NeverAgain social network?

RQ2: What emotional connections—sentiment—exist within the social network and the sense of community that leaders are attempting to build and sustain?

RQ3: To what extent does the #NeverAgain social network cluster within smaller niche interests and conversations?

METHODS

To address the research questions, the Twitter application programming interface (API; <http://apiwiki.twitter.com>) was utilized to retrieve tweets associated with the hashtag, #NeverAgain. One hundred thousand tweets were collected over the March 24 to March 29, 2018 period during which the live event, March for Our Lives took place. Of those 100,000 tweets, there were 65,915 unique posters. The Twitter API limits the number of tweets collected to 100,000 per day as a default. There were 70,274 names found in the network with 52,585 ties (self-loops). There were 20,568 posters with ties within the network. With regard to who replies to whom, the chain network, there were 3,889 posters with ties and 12,868 ties (self-loops).

To process, analyze and visualize the data, the research relied on Netlytic software (Netlytic.org). The analysis provided a list of top posters to the #NeverAgain hashtag network. Also provided was a list of the most frequently used words and a list of the top posters mentioned within messages. The data provided the basis for a sentiment analysis based on positive and negative terminology used in the Tweets. Sentiment analysis serves as an indicator of the emotional tone behind a series of words, in this case Tweets. It is a helpful process in understanding emotions expressed in online content. Finally, the data provided the basis for visualizations of both the name and chain networks associated with the #NeverAgain movement.

RESULTS

Mediators in social networks can be categorized as either elites, non-elites or core (Isa & Himelboim, 2018). Celebrities, for example, might qualify as elites in a social

network, whereas ordinary people would be categorized as non-elites. Members of the media are considered core moderators. In the case of the #NeverAgain social network, all three categories are represented.

RQ1: How does leadership within the social network impact the emergence and further development of the #NeverAgain social network?

The research identified three key mediators among the Parkland High School students who have taken on a leadership role. However, the top non-elite account is from @sandrahallstrom who was responsible for posting over 16% of the tweets. It is worth noting, and as an indication of the reach of the movement, this poster is from Sweden. Although it is difficult to determine whether @sandrahallstrom is a Swedish native or an American living in Sweden, the volume of the tweets makes it clear this individual is very engaged in this movement. This individual follows elite mediators including politicians such as Kamala Harris and Beto O'Rourke, and follows topics related to pop culture and current event notables (at that time) such as Stormy Daniels and attorney Michael Avenatti. And, @sandrahallstrom is a follower and frequently retweets several of the Parkland students, which is indicative of this individual's engagement in the #NeverAgain movement. Figure 1 shows the top 10 active members of this community based on the total number of posted messages.

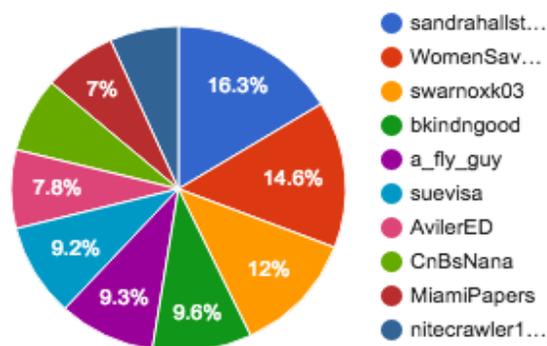


Figure 1. Top ten posters by percent of posts to the #NeverAgain social network.

The next most frequent poster was @WomenSaveUSA and this account dates to 2016 under the auspices of the DemocraticCoalition.org that focuses their communication on political issues. In February of 2018 when the Parkland shooting had just happened the account tweeted on the issue and retweeted several messages from the students and

referenced news articles regarding the event. For a period of time their tweets focused on Donald Trump and the Russia investigations that were ongoing at the time. Clearly politically motivated, this organization operates Artists Against Trump, a group of 50 artists and entertainers. The handle on Twitter @WomenSaveUSA is a veiled attempt to distance itself from political party politics, although the topics this organization tweets about are clearly political and directed specifically at Donald Trump.

A core mediator @Miamipapers is an account that represents Miami Secret Papers, an online news blog whose mission is to “shed light on the working conditions in Miami-Dade County.” The account has five thousand followers and has posted close to a quarter of a million tweets since 2016 on a variety of political issues. A review of the tweets indicates involvement in gun law reform. Also, much like @WomenSaveUSA, @Miamisecretpapers utilizes most of their posts, retweeting information and news.

An analysis of the words most often used in #NeverAgain tweets was conducted as well as an analysis of emotional sentiment—positive or negative—that was evident in the tweets. The research also developed a typology of tweets based on four categories that emerged from the analysis.

RQ2: What emotional connections—sentiment—exist within the social network and the sense of community that leaders are attempting to build and sustain?

In figure 2 below, data regarding the most frequently used words in the tweets surrounding #NeverAgain is presented. The word *tomorrow*, for example, is the second most used word, as the data collection for this research took place over the weekend when the March for Our Lives was held. The word tomorrow is utilized frequently in reference to the future of the movement, like one post exemplified below:

@MargaretLesh 21 Feb 2018

Today's #Parkland students are tomorrow's members of Congress. They are our future, and they give me hope. #ParklandStudentsSpeak

The #NeverAgain hashtag, identified as the calling card of the movement shows up frequently in tweets as does the reference to the March for Our Lives events planned nationwide and internationally.

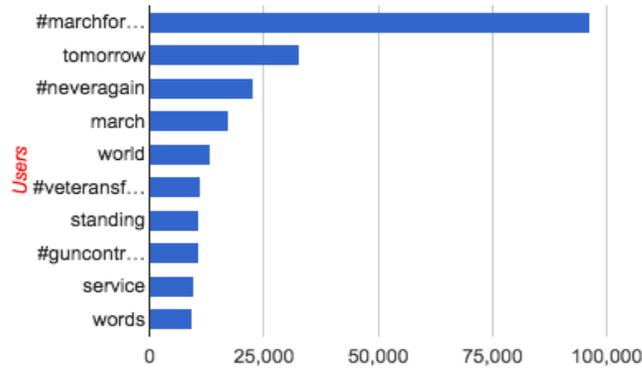


Figure 2. Ten most frequently used terms by those posting to the #NeverAgain social network.

Figure 3 lists the top posters mentioned in the movement. Emma Gonzalez (@emma4chage) is the top poster mentioned. The NAACP is a core mediator in the social network, along with video channel MTV. The NAACP, which already has a significant online following and the younger audiences engaged around the world by MTV, reflect varying types of relevance on this issue. The following are a sampling of tweets put forth by elite mediators:

jimmy fallon Verified account @jimmyfallon 24 Mar 2018
 Today is @AMarch4OurLives. I'm partnering with @MTV and @NAACP to sponsor a bus full of smart young young people traveling from NYC to #MarchForOurLives Washington, D.C. today. Thank you for standing up and saying you've had #ENOUGH. See you there.

Lady Gaga Verified account @ladygaga 23 Mar 2018
 .@BTWFoundation & I believe in the power of young people to create a better future. We're so proud to stand with @MTV & @NAACP to support the young people marching for safer schools and communities. I am proud to sponsor a bus, heading from Harlem to DC for #MarchForOurLives

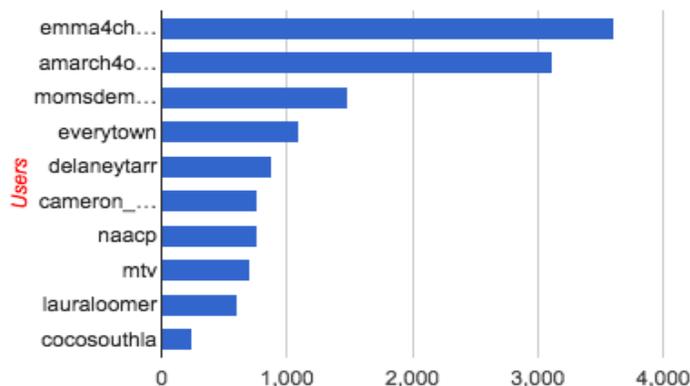


Figure 3. These are the top ten posters mentioned in other people's tweets or retweets.

In order to better understand the social network that developed around the #NeverAgain movement, the research conducted a sentiment analysis of tweets associated with the ongoing campaign. The research looked at both positive and negative words that appeared in the tweets identified by the Netlytic algorithm. There were 10,360 tweets expressing positive feelings, and there were 1,548 tweets expressing negative feelings. Of the positive tweets, the words proud, good, great, brave, courageous, excited and happy are predominant (See Table 1).

Table 1
Tweets Expressing Positive Emotions

Positive Emotions	Percent (%)	Total
Proud	40	4149
Good	14	1484
Great	9	906
Brave	10	987
Courageous	6	621
Excited	6	580
Happy	8	784

(N = 10,361)

A closer look at the data indicates the word “proud” is the word most often used in the positive tweets. The word was utilized as a hashtag to express support for the movement and those directly involved. Another way that the word proud was utilized was in regard to how participating in marches made people feel about themselves, as exemplified by the following tweets:

@LittleAlix 26 Mar 2018

So proud to support @AMarch4OurLives with my mom, who is a retired teacher, this past weekend at #MarchForOurLivesdc #marchforourlives #MarchForOurLivessigns #proud

@StacySwann

24 Mar 2018

Marching makes me #hopeful that change is possible. #Proud to see so many reject extremist views around gun control. The mainstream is #sensible.

#MarchForOurLives

#NeverAgain

#Emma4Change

The tweets indicate that the movement not only inspires political action, but it is also making those engaged in the movement feel positive and hopeful about their future. The next most frequently used word is “good.” The term, in some instances, is utilized in a way that can apply to different contexts. Below are examples of how “good” was utilized to garner support and attention:

@DaTeOla 24 Feb 2018

You don't argue w/a #pinhead #brainwashed #NRA #Troll. They're. #Psychopaths they don't differentiate btw #Good&Evil or #Happy&Sad for them all the same.

A #Sickbrain like #Potus45 #NeverAgain #MarchForOurLives #EnoughIsEnough #WomensMarch #MomsDemandAction #metoo #BoycottNRA

@cmclpt 24 Mar 2018

The baby boomers in their entitled delusional arrogance call the young "snow flakes" when they seek to raise the standards and challenge the poor behaviour and attitudes of their selfish elders.

Today we see an avalanche of righteous civility from them.

#MarchForOurLives #good

Table 2

Tweets Expressing Negative Emotions

Negative Emotions	Percent	Total (N)
Hurt	32	484
Angry	18	283
Bad	7	110
Lazy	5	84
Fierce	5	82
Tired	5	74
Evil	4	68
Ill	3	45
Sore	3	39
Selfish	2	38

(N = 1548)

Table 2 provides a list of negative words present in the tweets, but they are not always reflective of negative sentiment. For example, a word like “hurt” is the most used negative word in tweets posted by those engaged in the movement. The word “fierce” was used 82

times and was represented in 5 percent of the negative tweets. While the issue that began this movement may be dark, a negatively charged word like fierce in a particular context can actually be an expression of admiration and support.

In addition to analyzing sentiment, four broad categories of tweets were identified, including the following: sharing news and events, sharing knowledge and information and support, sharing opportunities, and sharing personal experiences. Table 3 categorizes the types of tweets found in the social network. Sharing news and events is an important factor because to grow and sustain the movement, you must make sure the followers are aware of and understand the main goal. As seen in the tweets below individuals who are not the core mediators of the movement are disseminating the information, acting as a conduit of sorts, demonstrating that in Iowa, for example, hundreds of miles from Parkland, other young activists are getting involved. A second category that plays a part in this process is sharing knowledge, information, and support. In order for others to have a desire to join the movement, they want to know that real change is even possible. The empathy displayed in sharing information and showing of support may be a way to connect with followers and turn passive publics into active publics. In addition to sharing news, information and support about the movement, the final two categories deal more with sharing of opportunities and personal experiences. The sharing of personal experiences is indicative of how pervasive the issue of gun violence is and breath of its impact across the social network.

Table 3
Four categories of social media posts

Category	Social Media Post
Sharing News & Events	1) @teamtrace 21 Jun 2018 Parkland survivors brought their voter registration bus tour to Sioux City, Iowa, on Wednesday, where they joined local students for a die-in outside the office of Congressman Steve King, a vocal #MarchforOurives critic. 2) @sandyhook 2 Jun 2018 ICYMI: Earlier this week Parkland students inspired voter registration at 1,000 schools https://t.co/sMpWbblJqJ
Sharing Knowledge, Information & Support	1) @nowayjose1947 Can't wait to vote for one of these young people. They will surely make better leaders than the ones destroying our

	<p>country today. These two are outstanding - #Emma4Change @davidhogg111 - but there are hundreds of others who will help save our democracy.</p> <p>2) @RandiRhodes 27 Mar 2018 Good Morning! Republican Justice John Paul Stevens: Repeal the Second Amendment https://nyti.ms/2Gghke4 #neveragain #emma4change #repealthesecondamendment #enoughisenough #GOPMEANSGUNSOVERPEOPLE</p>
Sharing Opportunities	<p>1) @joncoopertweets 24 Nov 2018 The Parkland students who created an international movement to raise awareness for gun violence after a deadly school shooting were awarded the International Children's Peace Prize at a ceremony in South Africa by Archbishop Desmond Tutu. #NeverAgain</p> <p>2) @FastCompany 1 Jun 2018 The Parkland teens led America beyond thoughts and prayers—and they're just getting started. @DavidHogg111, @JaclynCorin, @Cameron_Kasky, @Emma4Change, and @Al3xW1nd ignited a nationwide movement to take the gun-control debate to Wall Street. http://f-st.co/RxKGS3 #NeverAgain</p>
Sharing Personal Experiences	<p>1) @MorningEdition 14 Dec 2018 "Sandy Hook Promise," a non-profit anti-gun violence group formed after the attack, is training students around the nation to spot warning signs in other would-be shooters, and to anonymously report concerns through a mobile app</p> <p>2) @sethmoulton 29 May 2018 Last week, following the #SantaFeHighSchool shooting, I walked out of another "moment of silence" on the floor of the House of Representatives because the silence is deafening, our refusal to act is criminally negligent, and yet WE CAN FIX THIS for our kids.</p>

The research visually illustrates the social network among Twitter users including mentions, retweets or replies. Metrics for both reciprocity and modularity were utilized to summarize the nature of these interactions. The value for reciprocity, for example, is the ratio of reciprocal interactions, with values closer to 1 indicating that most users are

having two-way interactions. The value for modularity is the level of network clustering, with values closer to 1 suggesting that a network consists of many weakly connected users, rather than one coherent, highly connected group.

RQ3: To what extent does the #NeverAgain social network cluster within smaller niche interests and conversations?

Figure 4 provides a visualization of a name network in order to discover social connections among community members. Clusters of the same colors represent ‘nodes’ or groups of users communicating/sharing/reposting a tweet or tweets. The larger the group within a particular color, the more users it represents of those interacting around a post. The lines connecting users represent ‘ties’ between users who may mention another user in a tweet or sharing a tweet with a specific user. A name network examines messages while connecting one person (name) to another if they mention, reply, or repost another person’s tweet. In the case of #NeverAgain, the resulting network generated by Netlytic included 20,568 nodes and 52,585 ties (including self-loops). There were 70,274 names found in the network.

The image below (Figure 4) illustrates the clusters within and structure of the social network. In this name network, the colors represent different name clusters built from mining personal names in the messages. The clusters are the subgroups of users who are more interconnected among themselves than with users of other clusters.

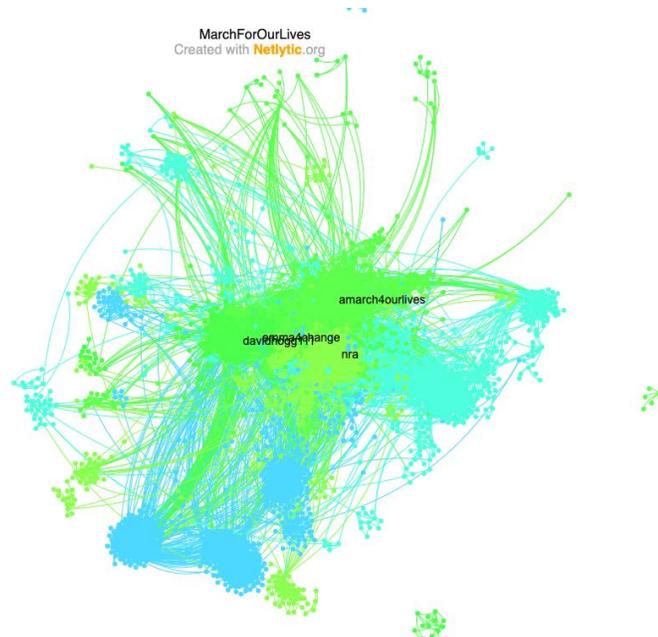


Figure 4 - Data Visualization of the name network of who is mentioning whom

In this name network visualization @emmaforchange, the handle for Emma Gonzalas, one of the movement's mediators is prominent along with David Hogg. There is little reciprocity (.0028) in this network signifying there is little back and forth communication but more likely a lot of re-tweeting of messages. Modularity is a measure of the communities within the network. In this case the modularity is relatively high (.0768) indicating there are distinct communities operating within the network, as opposed to a core group of nodes representing the network. To that end, both the National Rifle Association and @realdonaldtrump are represented in different clusters.

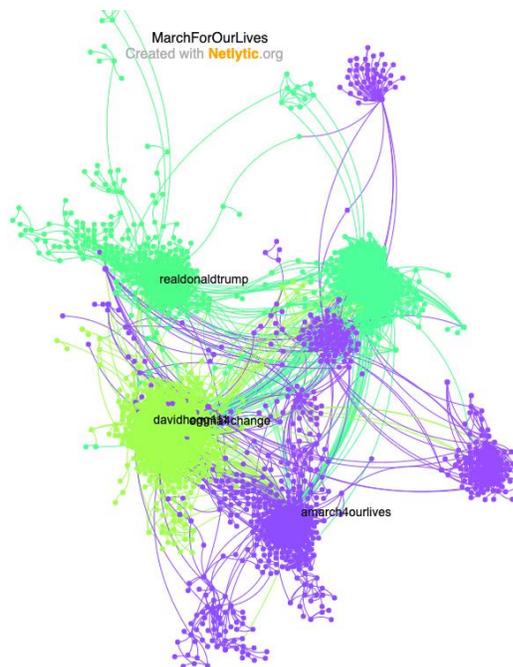


Figure 5. This is the chain network of who replies to whom

Figure 5 represents the chain network that reflects who is replying to whom. In this instance, Twitter users engaged indirectly and did not reciprocate communication from one user to another, identified by minimal two-way, back-and-forth conversations; this was reflected by low reciprocity value (Reciprocity: 0.0066). The relatively high modularity value (Modularity: 0.837) indicated that users interacted in small groups or clusters. There are 3,889 posters with ties, and the number of ties (including self-loops which are nodes that link back to themselves) is 12,865. The low value associated with reciprocity indicates a lack of reciprocal communication. And, the high modularity value indicates that small clusters are formed in the chain network.

DISCUSSION

The research set out to better understand how individuals join together and build social movements with the theoretical understanding that publics form around the situational relevance of a social or political issue. Rather than finding those engaged in the network as either activist, latent, aware or non-publics on the issue of gun control, what the research found was somewhat different than expected. Rather than a community that could be categorized by their fatalism or their belief in responding directly to a social issue, the research found clusters that operate within the broader social network in which those engaged represent divergent positions and political orientations. Social media has been often referred to as tribal, referring to the ways in which individuals coalesce around an issue, however, in this instance while the balance is in the direction that the movement desires, the social network accommodates other perhaps divergent opinions. In other words, among those within the social network are “likers” as well as “haters.” The network is not monolithic in the ways in which we might imagine social networks. There were in fact several clusters that formed; some were in support of the students and the cause and others were groups that formed were ridiculing the students and fighting to keep second amendment rights as they are presently construed. Clusters within the social network formed organically in response to particular posts from the main Parkland advocates (referred to as non-elite mediators) or when certain conversations surrounding stricter gun laws became more prevalent in the news. Other mediators fit into the elite and core categories to include celebrities and news media. Engagement in any of these clusters within the network simply requires the willingness to express oneself on social media or to share what someone else is posting. The spectrum of opinions evident online regarding the Parkland shooting and gun control advocacy leads to the development of clusters and niches providing space for various sides on the issue to engage on some aspect of this movement and the broader issue of gun control.

Social networks, as demonstrated by this data, are made up of clusters and niches through which sentiment is expressed that is reflective of the relevance of the issue to those engaged in the network. Some individuals engage in the network to “rally the troops” so to speak encouraging direct participation, while others use the network to denigrate the students and their supporters. Yet others use the platform to spread news

and information, or use the network to share their feelings and personal experiences. There were tweets from individuals that were parents of Sandy Hook students tweeting to parents of Parkland students in solidarity and support. Politicians were tweeting about how the Parkland movement had inspired them to champion change. There were also individuals who thought the Parkland students were disrespectful and acting like spoiled children. The data gathered for this research indicated that tweets were formed around four categories: the sharing of news and events, personal knowledge or beliefs, information and support, opportunities to engage in the movement, and the sharing of personal experiences. When the movement was in the emergence stage the sharing of news and events was crucial to building the base, meaning that was how people knew to come to rallies and marches and voter registration events. As the movement quickly gained momentum, tweets evolved to extend sharing of information and support. There were many tweets using the hashtag #NeverAgain #Parkland and #Enough just to name a few that generated clusters of engaged people showing sympathy and support. As the movement progressed clusters of people formed that were expressions of personal impact by other mass shootings.

CONCLUSION

As discussed earlier, Gruzd et al. (2018) describe the imagined community as a social network dispersed geographically that coalesces around a cause or issue, perhaps forming a social movement. But unlike a traditional (physically close) community, the members of a virtual community do not necessarily know one another, as they are not limited by geography, among other factors. In recent years there has been an increase of highly visible movements many of which have been referred to in this research that have formed on social media in response to social injustices. As a result of these movements social networks have formed both in support and in opposition to the cause or issue. In 2018 the Parkland shooting gave rise to the #NeverAgain movement, which is the focus of this research. In the aftermath on February 14, 2018 the students in Parkland Florida began to effectively utilize social media to tell their story, and they have been able to sustain the movement as they have extended its reach and scope.

It became evident that in addition to introducing their position on gun control through social media, the mediators also proved to be strong opinion leaders that serve to strengthen and sustain the movement. They exhibited what might be referred to as the power of framing in that they strategically amplified the story. Gonzalez, Hogg and Kasky never bargained to be at the forefront of the gun control issue. As circumstances forced the Parkland students to confront lawmakers, they rallied others to their cause. And then they took to the streets of Washington, DC, to put on March for Our Lives, make impassioned pleas for reform and declare, "Never Again" (Andone, 2019). Such a social network as this could not have existed in April 20, 1999 when the shooting at Columbine occurred. Having this sort of network exist online and be able to share information, news and support, made this school shooting seem different. As David Cullen, author of the book *Columbine*, stated "...the kids of Parkland may finally show us a way out of this national nightmare." As Cullen states: "I was in awe. Within a few days of the shooting, planning for the caravan to meet with legislators in Tallahassee *and* the March for Our Lives in D.C. was underway. My editor at *Vanity Fair* asked me to be on the lookout for who was really pulling the strings. Are Obama people down there? A group of high schoolers can't be this smart and organized. I had feelers up for a few weeks, but I realized, yes, they can. Watching the Parkland students figure it out as they went along was incredible" (in Sauer, 2019).

Limitations of this research

This research was limited to studying the use of the hashtag #NeverAgain on the social platform Twitter. There are other hashtags associated with this movement. As well, there are other social media platforms, including Instagram and Facebook, on which the movement is being promoted. As the intention of the present study is to focus on the use of one hashtag on one social media platform, the study is limited in its scope and reach. Due to the ephemeral nature of Snapchat, a platform that younger people are active on, the research was not able to consider data from that platform.

Suggestions for future research

It is suggested that future research might extend to consider other hashtags and network users to create a more expansive view of the movement. Additionally, expanding the research to consider additional social media platforms will provide a broader

understanding of the role of social media in the efforts to sustain over time this social and political movement.

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Online Connections

To follow these authors in social media:

Neil Alperstein: @NeilAlperstein

Tina Jones: @lowvisionURA